



**norner**<sup>TM</sup>

Innovation through Insight



# Plastics and material technology institute

We deliver customer solutions



# Partner for plastics offshore

*Our innovation centre provide services in materials technology to the offshore industry building on 30 years of experience in plastics.*

*Tine Rørvik, Managing Director*



A photograph of an offshore oil rig structure extending into the ocean under a clear blue sky. The rig has a tall tower with a red and white striped section and a platform with several windows. Dashed lines from the rig's structure lead to the text sections below.

# Projects

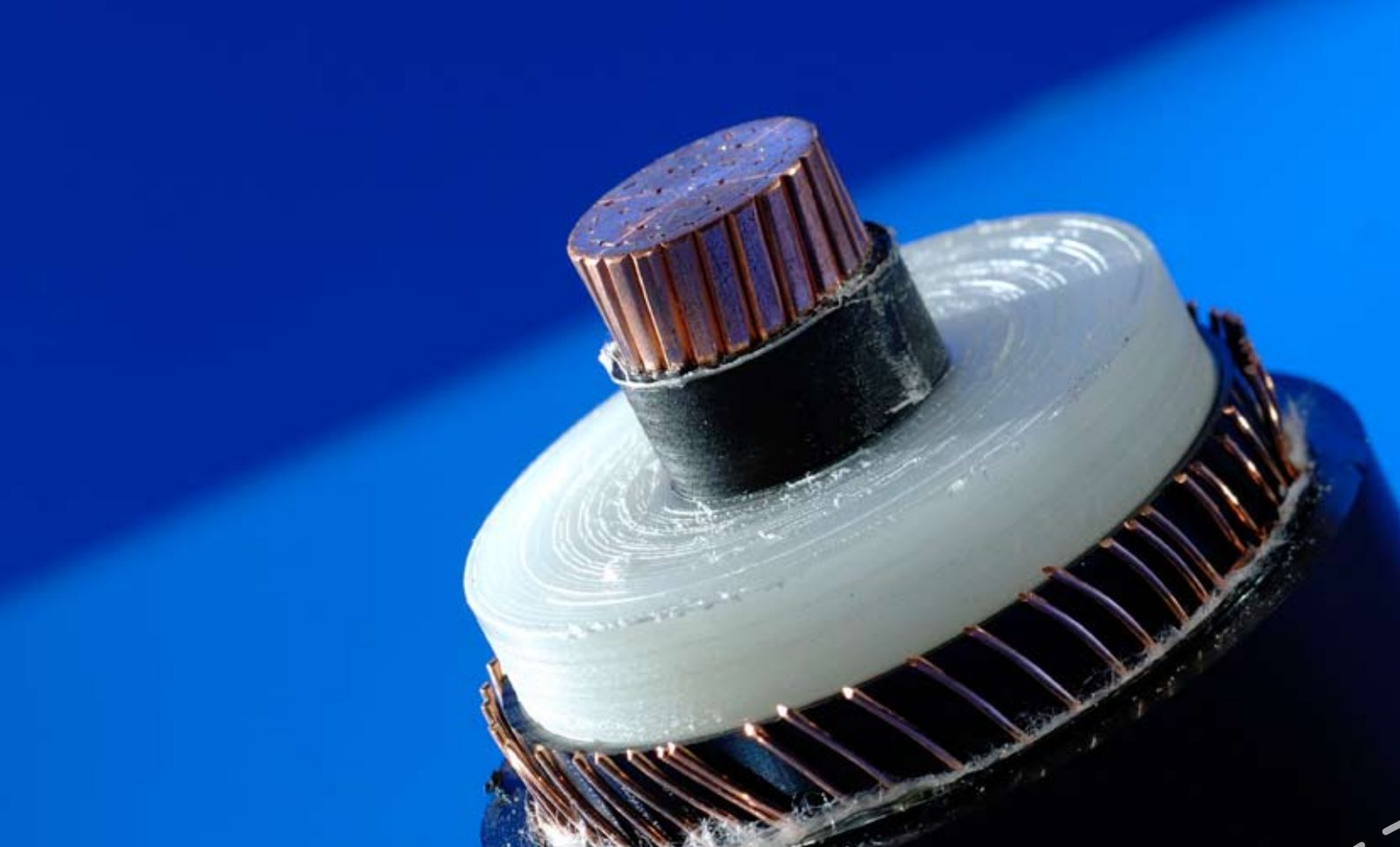
- Industrial research projects
- Product developments and improvements
- Product performance testing and verification
- Quality improvement and trouble shooting
- Supplier qualification and specification
- Benchmarking of alternative concepts
- Material evaluation and selection
- Product and failure investigations
- Durable and light weight material solutions
- Tailor made seminars and training

# Facilities

- Plastics processing centre
- Component and product test facilities
- Material and analytical test centre
- Chemical and polymer analytics
- Process pilots and simulation
- NORSOK test centre

# Innovation

- Product development
- Project management
- Technology leadership
- Material development
- International network



# Plastic materials and solutions

We contribute to development of high quality and innovative plastic solutions for demanding offshore requirements.

*Thor Kamffjord, BA Manager Plastic Solutions*



# Projects

Plastics material development and research  
Product performance improvements  
Technology and concept investigations  
Additive optimisation and harmonisation  
End of life investigations and evaluations  
Performance assessment of new solutions  
Problem solving and failure analysis  
Material recipe development  
Material processing trials  
Mould flow analysis

# Facilities

Injection moulding  
Rotational moulding  
Film and bottle extrusion lines  
Compounding lines  
Adhesives testing  
Product testing laboratories

# Support

Processing trials  
Failure analysis  
Performance and durability tests  
Product test centre  
Material selection



# Quality control and improvement

*Norner takes an active role in developing more durable plastic solutions.*

*Henning Baann, BA Manager Scientific Laboratories*





# Projects

- Performance testing of plastics
- Advice and benchmarking of materials
- Verification and consistency of properties
- Ageing tests at high pressure and temperature
- Maintenance support in material state and failure
- Developing appropriate product specifications
- Inspection plans for plastic parts and systems
- Product durability at extreme conditions
- Extraction behaviour of materials
- Quality review and supplier audits
- Third party investigations

# Facilities

- Autoclave testing laboratory
- Material performance laboratories
- Testing at various climate conditions
- Advanced microscopy laboratory
- Durability and fatigue testing
- NORSOK M-501 test centre

# Competence

- Plastic technologies
- Material performance
- Material failure investigation
- Durability testing
- ISO 9001:2008 and ISO 17025

Contact us via  
[www.norner.no](http://www.norner.no)



Intsok ▪ Achilles ▪ ISO 9001 ▪ ISO 17025



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